STORMS AND WEATHER WARNINGS

WASHINGTON FORECAST DISTRICT

Storm warnings were issued in connection with five disturbances during the month. On the morning of the 1st a disturbance of very slight intensity was centered near the mouth of the Mississippi River and pressure was abnormally high over southern Canada and the greater part of the United States east of the Rocky Mountains. Two p. m. special observations indicated that the disturbance would advance to the Georgia coast and move rapidly northeastward with a marked increase in intensity. Accordingly, northeast storm warnings were ordered displayed at 4:30 p. m. from Beaufort, N. C., to Atlantic City, N. J., and at 10 p. m. northwest warnings were displayed from Jacksonville, Fla., to Savannah, Ga. The following morning the storm center was near Cape Hatteras, where the barometer reading was 29.22 inches, and at 9:30 a.m. northwest storm warnings were ordered north of Savannah to Morehead City, N. C., and northeast warnings north of Atlantic City to Boston, Mass. At 2 p. m. the northeast warnings were extended to Eastport, Me. This storm increased in area and intensity and became quite severe. Maximum wind velocities of 60 miles an hour or more were reported quite generally along the Atlantic coast from Cape Hatteras to Cape Cod, Hatteras reporting 70 miles per hour from the north, and Nantucket and Highland Light, Mass., 72 and 74 miles per hour, respectively, from the northeast. This was by far the most severe storm during March.

The morning of the 8th a disturbance of marked intensity was central over the upper St. Lawrence Valley with a trough extending southward to the North Carolina coast, and northeast storm warnings were displayed at 9:30 a. m. from Cape Hatteras to Boston. Several stations reported maximum velocities in excess of 40 miles per hour, and New York City reported 64 miles per hour from the northwest. The following morning a disturbance of moderate intensity that had developed over northern Mexico was centered over Georgia, moving east-northeastward, and northeast storm warnings were displayed at 11 a. m. from Beaufort, N. C., to the Virginia Capes. This disturbance did not increase in intensity as expected; consequently no winds of gale

force occurred.

No further warnings were required until the 24th, when a disturbance of moderate but increasing intensity was advancing northeastward over the ocean between Bermuda and the southern New England coast. At 4:30 p. m. northeast storm warnings were displayed from Block Island, R. I., to Boston. The highest velocity reported on the coast was 52 miles per hour from the northeast at Nantucket. By the time this storm had reached Newfoundland the barometer had fallen to 28.88 inches near its center.

The last warnings of the month were displayed at 6 p. m. of the 26th from Cape Henry to Atlantic City in connection with a secondary disturbance that developed over Maryland and Virginia and advanced eastward over the ocean. It did not increase materially in intensity, however, and no strong winds occurred along the coast.

Small-craft warnings were displayed along the Mississippi, Alabama, and extreme northwest Florida coasts on the 1st and 12th and along portions of the Atlantic coast on the 9th, 23d, 24th, and 25th. A warning of strong northerly winds for the Panama Canal Zone was issued the evening of the 2d.

Few frost warnings were required during the first 20 days of the month and were confined to the South Atlantic and east Gulf States. The most important warnings of the month were those of the 2d and 3d. Killing frost and freezing temperature occurred from Mobile, Ala., eastward to Jacksonville, Fla., on the morning of the 3d, and light to heavy frost as far south as Miami the following morning.

On account of unseasonably warm weather between the 5th and 21st vegetation advanced quite rapidly and frost warnings were required as far north as Kentucky and southern Virginia by the latter date. Frequent warnings were issued during the last 10 days of the month, but no killing frosts were reported.—C. L.

Mitchell.

CHICAGO FORECAST DISTRICT

Mild temperatures, with only slight interruptions to cooler weather, continued throughout the month in practically the entire forecast district. The excess in temperature was considerable from the Great Lakes westward, record-breaking maxima, for so early in the season, of 76° at Omaha and 68° at Minneapolis being reported on the 15th, and 71° at Chicago on the 16th; and the only deficiency was in the extreme southwest portion of the district.

The weather, otherwise, was not unusual, except for rather heavy precipitation in the lower Ohio, middle Mississippi and lower Missouri Valleys and adjoining

sections, resulting in some flood conditions.

The low-pressure areas which crossed the forecast district, almost without exception, came from the far West, and in their passage the centers lay either in the middle or in the northerly portions of the district, with

the troughs extending to the south.

Advisory messages were sent to open ports on Lake Michigan, on several occasions, in advance of storm conditions; and an especially strong warning was issued on the night of the 31st, when the weather map showed a marked storm development in the middle Missouri Valley. This storm moved directly eastward, and strong winds occurred within the next 24 to 36 hours over the greater portion of Lake Michigan.

No casualties were reported on the lake during the month and navigation increased over the southern half during the closing days, due to unusual freedom from

ice following the protracted mild weather.

Special warnings were sent daily to certain interests, including shippers of apples from the North Pacific States, banana interests and shippers of ink in the Middle West.—H. J. Cox.

NEW ORLEANS FORECAST DISTRICT

Moderate weather prevailed over most of the district during March. Cold-wave warnings were issued on the night of the 18th for Oklahoma, northwestern Texas, and northwestern Arkansas, were repeated on the 19th, and were extended on that date over Arkansas, the interior of Texas, and northwestern Louisiana. On the morning of the 20th warnings were extended to the Texas coast. These warnings were verified over most of the territory covered and temperature fell decidedly throughout the district.

Frost or freeze warnings were issued for parts of the district on the 1st, 2d, 3d, 9th, 12th, 17th, 20th, 21st, 22d, and 24th; frost occurred generally in the areas covered, and no frost of any consequence occurred with-

out warnings.